

UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE United States Patent and Trademark Office Address: COMMISSIONER OF PATENTS AND TRADEMARKS Washington, D.C. 20231 www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO	
09/758,514	01/11/2001	Rainer Ludwig	HOE520	8392	
75	90 04/07/2003				
Edward J. Timmer			EXAMINER		
Walnut Woods Center 5955 W. Main Street			RAEVIS, R	RAEVIS, ROBERT R	
Kalamazoo, MI	49009		ART UNIT	PAPER NUMBER	
			2856		
			DATÉ MAIL ED: 04/07/2003		

Please find below and/or attached an Office communication concerning this application or proceeding.

	Application No.	Applicant(s)	Ludwig	1/
Office Action Summary	Examiner RAE VIJ		Group Art Unit ≥856	
—The MAILING DATE of this communication appears	on the cover sheet b	eneath the co	orrespondence ad	ddress
Peri d for Reply	3			1
A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO OF THIS COMMUNICATION.	EXPIRE 3	MONTH(S) FROM THE MAII	LING DATE
 Extensions of time may be available under the provisions of 37 CFR 1.1 from the mailing date of this communication. If the period for reply specified above is less than thirty (30) days, a replectified in the period for reply is specified above, such period shall, by default, or Failure to reply within the set or extended period for reply will, by statute 	y within the statutory minim xpire SIX (6) MONTHS fror	um of thirty (30) n the mailing dat	days will be considere	ed timely.
Status				
 Responsive to communication(s) filed on This action is FINAL. Since this application is in condition for allowance except for accordance with the practice under Ex parte Quayle, 1935 	or formal matters, pros	ecution as to 3.	the merits is clo	sed in
Disposition of Claims				•
		is/are	pending in the app	lication.
Of the above claim(s)				nsideration.
□ Claim(s)		is/are	allowed.	
\Rightarrow efaim(s) $1-11, 13-20, 23, 25, 2$	6, 34, 37, 39	+ ≥, is/are	rejected. +6	
Claim(s) 12, 21, 22, 24, 27-33, 35	-, 36, 38, 43 -	・43 _/ is/are	objected to. +7	-53
□ Claim(s)			bject to restriction	
Application Papers				
☐ See the attached Notice of Draftsperson's Patent Drawing	•		_	
☐ The proposed drawing correction, filed on		☐ disapprove	d.	
☐ The drawing(s) filed on is/are objected.	ed to by the Examiner.			
☐ The specification is objected to by the Examiner.				
☐ The oath or declaration is objected to by the Examiner.				
Priority under 35 U.S.C. § 119 (a)-(d)		4.15		
Acknowledgment is made of a claim for foreign priority und All Some* None of the CERTIFIED copies Copies of the Certified Copies Cop	ne priority documents h	ave been	i i	
*Certified copies not received:				
Attachment(s)				
Information Disclosure Stat ment(s), PTO-1449, Paper No	(s) 6,7 n	nterview Sum	mary, PTO-413	
□ Notice of Refer nce(s) Cited, PTO-892			mal Patent Applica	ition, PTO-152
☐ Notice of Draftsperson's Patent Drawing Review, PTO-948			That I don't pprod	
Office	Action Summary			

Applicant(s)

Art Unit: 2856

- 1. The drawings are objected to as failing to comply with 37 CFR 1.84(p)(5) because they do not include the following reference sign(s) mentioned in the description: reference 200 (age 21, line 10). Correction is required.
- 2. The subject matter of page 41 must be deleted, as it is not appropriate to place material between the claims and Abstract in an application. Applicant may reinsert the material onto page 1 of the application.
- 3. Claims 3, 9, 13, 20 and 25 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

As to claim 3; "the controlled value" lacks antecedent basis.

As to claims 9, 13, "the predefined position-time course" lacks antecedent basis.

As to claim 20; "the torque control device" lacks antecedent basis.

As to claim 25; "the torque limit" lacks antecedent basis.

4. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless --

- (b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.
- 5. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:
 - (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are

Application/Control Number: 09/758,514

Art Unit: 2856

such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

6. Claims 1-5, 11, 13, 26, 37, 46, 39, 40, 41, 42 are rejected under 35 U.S.C. 102(b) as anticipated by or, in the alternative, under 35 U.S.C. 103(a) as obvious over WO 88/00511.

The reference teaches a device, including: checking element 12 or 14, motor and power supply to power the motor.

The reference's Abstract does not refer to control.

As to claims 1, 4, 11, 26; either the power supply may be deemed to control the motor, as it is the power supply that directs motor movement, or in the alternative, the reference's teaching of detecting shaft position during rotation is suggestive that the position detection has use for control, example being a feed back to control the position of velocity of the shaft.

As to claims 2, 3, 5, 13; application of the motor with a machine tool (Fig. 2) infers some level of automation in the tool's use.

As to claims 37, 46, 39, 40, 41, 42; note the structural components (esp element 28) between bearing 32 and housing 22, the components both lending for support and sealing from the outside environment.

7. Claims 6-10, 14, 20, 15, 23, 16-19, 34 are rejected under 35 U.S.C. 103(a) as being unpatentable over .WO 88/00511

Application/Control Number: 09/758,514

Art Unit: 2856

As to claims 6-10, 18, 19, 34; it would have been obvious to employ the machine tool in an automated system because automated systems demand electrical motors (drills) with sensors. In addition, the working times for machine tools under automated circumstances are fixed.

As to claims 14, 15; the reference's teaching of detecting shaft position during rotation is suggestive that the position detection has use for control, example being a feed back to control the position of velocity of the shaft. Automated systems demand control by use of sensors.

As to claims 20, 23, 16, 17; it is known that motors employ torque limiters.

- 8. Claims 12, 21, 22, 24, 27-33, 35, 36, 47-53, 38 and 43-45 are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.
- 9. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.

Goodsmith tests for position.

Harjar et al calibrates a motor type system.

Weiss teaches testing a machine.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to R. Raevis whose telephone number is (703) 305-4919. The fax phone number for the organization where this application or proceeding is assigned is (703) 308-7722.

ROWD